

State of Utah

## Department of **Environmental Quality**

Dianne R. Nielson, Ph.D. Executive Director

DIVISION OF AIR QUALITY Richard W. Sprott Director

OLENE S. WALKER Governor

GAYLE F. McKEACHNIE Lieutenant Governor

Site ID: 10238

## **Title V Operating Permit**

**PERMIT NUMBER: 1501001001** DATE OF PERMIT: January 7, 1998 Date of Last Revision: November 6, 2003

This Operating Permit is issued to, and applies to the following:

Name of Permittee: **Permitted Location:** 

**PacifiCorp Huntington Power Plant** 1407 W. North Temple P. O. Box 680 Salt Lake City, UT 84140 Huntington, UT 84528

UTM coordinates: 4,358,840 meters Northing, 493,130 meters Easting

SIC code: 4911

#### **ABSTRACT**

The PacifiCorp Huntington Power Plant is a coal-fired steam electric generating facility consisting of two units. Unit #1 is a 480 MW unit constructed in October 1973; Unit #2 is a 480 MW unit that commenced construction in April 1970. Bituminous and sub-bituminous coal is the primary fuel source for the boilers, which are both dry bottom, tangentially-fired units. Fuel oil is used to start up the boilers from a cold start, for main boiler flame stabilization, and to operate the auxiliary boilers for both units. The auxiliary boiler for Unit #1 is a 120 MMBtu/hr unit constructed in 1975; Unit #2's auxiliary boiler has a 93 MMBtu/hr capacity and was constructed in 1970. The Huntington Power Plant uses an electrostatic precipitator and flue gas desulfurization scrubber to reduce pollution from Unit #1 and an electrostatic precipitator only for Unit #2. The plant is a Phase II Acid Rain source and is a major source of SO<sub>2</sub>, NOX, PM<sub>10</sub>, CO, and HCl emissions.

UTAH AIR QUALITY BOARD

By: Prepared By:

Richard W. Sprott, Executive Secretary

Jennifer He



# **Operating Permit History**

1/7/1998 - Permit issued	Action initiated by an initial operating permit application	
6/29/1999 -Permit modified	Action initiated by a reopening of an operating permit for cause	to correct language in provision I.U.1 regarding inventory submittal; to incorporate a NO <sub>x</sub> averaging plan under 40 CFR Part 76; and to correct minor administrative errors in permit.
2/14/2000 -Permit modified	Action initiated by a reopening of an operating permit for cause	to incorporate compliance plan language from 40 CFR 76.11 in response to EPA guidance and to make minor corrections to the emission unit list and two reporting conditions. There is no change in emissions as a result of these actions.
3/6/2002 -Permit modified	Action initiated by an administrative amendment (initiated by DAQ)	due to issuance of DAQE-119-02 for adding coal blending equipments. Title V permit renewal date has been changed to 6 months prior to the permit expiration date, making it consistent with most of the sources in Utah.
11/6/2003 -Permit modified	Action initiated by an administrative amendment (initiated by DAQ)	due to issuance of AO DAQE- AN0238008A-03, for equipment changes at the blending coal pile operation

# **Table of Contents**

SECTIO	N I: GENERAL PROVISIONS	1
I.A.	FEDERAL ENFORCEMENT.	1
I.B.	PERMITTED ACTIVITY(IES).	1
I.C.	DUTY TO COMPLY.	1
I.D.	PERMIT EXPIRATION AND RENEWAL.	2
I.E.	APPLICATION SHIELD.	2
I.F.	SEVERABILITY	2
I.G.	PERMIT FEE	2
I.H.	No Property Rights.	2
I.I.	REVISION EXCEPTION.	2
I.J.	INSPECTION AND ENTRY	3
I.K.	CERTIFICATION	3
I.L.	COMPLIANCE CERTIFICATION	3
I.M.	PERMIT SHIELD	4
I.N.	EMERGENCY PROVISION.	5
I.O.	OPERATIONAL FLEXIBILITY	5
I.P.	OFF-PERMIT CHANGES.	5
I.Q.	ADMINISTRATIVE PERMIT AMENDMENTS.	5
I.R.	PERMIT MODIFICATIONS.	5
I.S.	RECORDS AND REPORTING.	5
I.T.	REOPENING FOR CAUSE.	7
I.U.	INVENTORY REQUIREMENTS	7
I.V.	TITLE IV AND OTHER, MORE STRINGENT REQUIREMENTS	8
<b>SECTIO</b>	N II: SPECIAL PROVISIONS	8
II.A.	EMISSION UNIT(S) PERMITTED TO DISCHARGE AIR CONTAMINANTS	8
II.B.	REQUIREMENTS AND LIMITATIONS.	10
II.B	.1 Conditions on permitted source (Source-wide)	11
II.B		
II.B		
II.B	•/	
II.B		
II.B	.6 Conditions on Coal handling and Blending Equipments (Emission unit #41)	25
II.C.	EMISSIONS TRADING.	26
II.D.	ALTERNATIVE OPERATING SCENARIOS.	26
II.E.	SOURCE-SPECIFIC DEFINITIONS	26
<b>SECTIO</b>	N III: PERMIT SHIELD	27
	N IV: ACID RAIN PROVISIONS	
	UTAH ACID RAIN PROGRAM AUTHORITY.	
	PERMIT REQUIREMENTS.	
IV.C.	SULFUR DIOXIDE REQUIREMENTS.	29
IV.D.	NITROGEN OXIDES REQUIREMENTS.	30
	MONITORING REQUIREMENTS.	
	RECORDKEEPING AND REPORTING REQUIREMENTS	
IV.G.	EXCESS EMISSIONS REQUIREMENTS.	34
IV.H.	LIABILITY.	34
IV I	EFFECT ON OTHER AUTHORITIES.	35

Issued under authority of Utah Code Ann. Section 19-2-104 and 19-2-109.1, and in accordance with Utah Administrative Code R307-415 Operating Permit Requirements.

All definitions, terms and abbreviations used in this permit conform to those used in Utah Administrative Code R307-101 and R307-415 (Rules), and 40 Code of Federal Regulations (CFR), except as otherwise defined in this permit. Unless noted otherwise, references cited in the permit conditions refer to the Rules.

Where a permit condition in Section I, General Provisions, partially recites or summarizes an applicable rule, the full text of the applicable portion of the rule shall govern interpretations of the requirements of the rule. In the case of a conflict between the Rules and the permit terms and conditions of Section II, Special Provisions, the permit terms and conditions of Section II shall govern except as noted in Provision I.M, Permit Shield.

## **Section I: General Provisions**

#### I.A. Federal Enforcement.

All terms and conditions in this permit, including those provisions designed to limit the potential to emit, are enforceable by the EPA and citizens under the Clean Air Act of 1990 (CAA) except those terms and conditions that are specifically designated as "State Requirements". (R307-415-6b)

### I.B. Permitted Activity(ies).

Except as provided in R307-415-7b(1), the permittee may not operate except in compliance with this permit. (See also Provision I.E, Application Shield)

#### I.C. **Duty to Comply.**

- I.C.1 The permittee must comply with all conditions of the operating permit. Any permit noncompliance constitutes a violation of the Air Conservation Act and is grounds for any of the following: enforcement action; permit termination; revocation and reissuance; modification; or denial of a permit renewal application. (R307-415-6a(6)(a))
- I.C.2 It shall not be a defense for a permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit. (R307-415-6a(6)(b))
- I.C.3 The permittee shall furnish to the Executive Secretary, within a reasonable time, any information that the Executive Secretary may request in writing to determine whether cause exists for modifying, revoking and reissuing, or terminating this permit or to determine compliance with this permit. Upon request, the permittee shall also furnish to the Executive Secretary copies of records required to be kept by this permit or, for information claimed to be confidential, the permittee may furnish such records directly to the EPA along with a claim of confidentiality. (R307-415-6a(6)(e))
- I.C.4 This permit may be modified, revoked, reopened, and reissued, or terminated for cause. The filing of a request by the permittee for a permit modification, revocation and reissuance, or termination, or of a notification of planned changes or anticipated noncompliance shall not stay

any permit condition, except as provided under R307-415-7f(1) for minor permit modifications. (R307-415-6a(6)(c))

### I.D. Permit Expiration and Renewal.

- I.D.1 This permit is issued for a fixed term of five years and expires on January 7, 2003. (R307-415-6a(2))
- I.D.2 Application for renewal of this permit is due by July 7, 2002. An application may be submitted early for any reason. (R307-415-5a(1)(c))
- I.D.3 An application for renewal submitted after the due date listed in I.D.2 above shall be accepted for processing, but shall not be considered a timely application and shall not relieve the permittee of any enforcement actions resulting from submitting a late application. (R307-415-5a(5))
- I.D.4 Permit expiration terminates the permittee's right to operate unless a timely and complete renewal application is submitted consistent with R307-415-7b (see also Provision I.E, Application Shield) and R307-415-5a(1)(c) (see also Provision I.D.2). (R307-415-7c(2))

#### I.E. Application Shield.

If the permittee submits a timely and complete application for renewal, the permittee's failure to have an operating permit will not be a violation of R307-415, until the Executive Secretary takes final action on the permit renewal application. In such case, the terms and conditions of this permit shall remain in force until permit renewal or denial. This protection shall cease to apply if, subsequent to the completeness determination required pursuant to R307-415-7a(3), and as required by R307-415-5a(2), the applicant fails to submit by the deadline specified in writing by the Executive Secretary any additional information identified as being needed to process the application. (R307-415-7b(2))

#### I.F. Severability.

In the event of a challenge to any portion of this permit, or if any portion of this permit is held invalid, the remaining permit conditions remain valid and in force. (R307-415-6a(5))

#### I.G. **Permit Fee.**

- I.G.1 The permittee shall pay an annual emission fee to the Executive Secretary consistent with R307-415-9. (R307-415-6a(7))
- I.G.2 The emission fee shall be due on October 1 of each calendar year or 45 days after the source receives notice of the amount of the fee, whichever is later. (R307-415-9(4)(a))

#### I.H. No Property Rights.

This permit does not convey any property rights of any sort, or any exclusive privilege. (R307-415-6a(6)(d))

### I.I. Revision Exception.

No permit revision shall be required, under any approved economic incentives, marketable permits, emissions trading and other similar programs or processes for changes that are provided for in this permit. (R307-415-6a(8))

#### I.J. Inspection and Entry.

- I.J.1 Upon presentation of credentials and other documents as may be required by law, the permittee shall allow the Executive Secretary or an authorized representative to perform any of the following:
- I.J.1.a Enter upon the permittee's premises where the source is located or emissions related activity is conducted, or where records are kept under the conditions of this permit. (R307-415-6c(2)(a))
- I.J.1.b Have access to and copy, at reasonable times, any records that must be kept under the conditions of this permit. (R307-415-6c(2)(b))
- I.J.1.c Inspect at reasonable times any facilities, equipment (including monitoring and air pollution control equipment), practice, or operation regulated or required under this permit. (R307-415-6c(2)(c))
- I.J.1.d Sample or monitor at reasonable times substances or parameters for the purpose of assuring compliance with this permit or applicable requirements. (R307-415-6c(2)(d))
- I.J.2 Any claims of confidentiality made on the information obtained during an inspection shall be made pursuant to Utah Code Ann. Section 19-1-306. (R307-415-6c(2)(e))

#### I.K. Certification.

Any application form, report, or compliance certification submitted pursuant to this permit shall contain certification as to its truth, accuracy, and completeness, by a responsible official as defined in R307-415-3. This certification shall state that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete. (R307-415-5d)

#### I.L. Compliance Certification.

- I.L.1 Permittee shall submit to the Executive Secretary an annual compliance certification, certifying compliance with the terms and conditions contained in this permit, including emission limitations, standards, or work practices. This certification shall be submitted no later than **April 1, 2000** and that date each year following until this permit expires. The certification shall include all the following (permittee may cross-reference this permit or previous reports): (R307-415-6c(5))
- I.L.1.a The identification of each term or condition of this permit that is the basis of the certification:
- I.L.1.b The identification of the methods or other means used by the permittee for determining the compliance status with each term and condition during the certification period, and whether such methods or other means provide continuous or intermittent data. Such methods and other means shall include, at a minimum, the monitoring and related recordkeeping and reporting requirements in this permit. If necessary, the permittee also

shall identify any other material information that must be included in the certification to comply with section 113(c)(2) of the Act, which prohibits knowingly making a fake certification or omitting material information;

- I.L.1.c The status of compliance with the terms and conditions of the permit for the period covered by the certification, based on the method or means designated in Provision I.L.1.b. The certification shall identify each deviation and take it into account in the compliance certification. The certification shall also identify as possible exceptions to compliance any periods during which compliance is required and in which an excursion or exceedance as defined under 40 CFR Part 64 occurred; and
- I.L.1.d Such other facts as the Executive Secretary may require to determine the compliance status.
- I.L.2 The permittee shall also submit all compliance certifications to the EPA, Region VIII, at the following address or to such other address as may be required by the Executive Secretary: (R307-415-6c(5)(d))

Office of Enforcement, Compliance and Environmental Justice (mail code 8ENF)
EPA, Region VIII
999 18th Street, Suite 300
Denver, CO 80202-2466

#### I.M. **Permit Shield.**

- I.M.1 Compliance with the provisions of this permit shall be deemed compliance with any applicable requirements as of the date of this permit, provided that:
- I.M.1.a Such applicable requirements are included and are specifically identified in this permit, or (R307-415-6f(1)(a))
- I.M.1.b Those requirements not applicable to the source are specifically identified and listed in this permit. (R307-415-6f(1)(b))
- I.M.2 Nothing in this permit shall alter or affect any of the following:
- I.M.2.a The emergency provisions of Utah Code Ann. Section 19-1-202 and Section 19-2-112, and the provisions of the CAA Section 303. (R307-415-6f(3)(a))
- I.M.2.b The liability of the owner or operator of the source for any violation of applicable requirements under Utah Code Ann. Section 19-2-107(2)(g) and Section 19-2-110 prior to or at the time of issuance of this permit. (R307-415-6f(3)(b)
- I.M.2.c The applicable requirements of the Acid Rain Program, consistent with the CAA Section 408(a). (R307-415-6f(3)(c))
- I.M.2.d The ability of the Executive Secretary to obtain information from the source under Utah Code Ann. Section 19-2-120, and the ability of the EPA to obtain information from the source under the CAA Section 114. (R307-415-6f(3)(d))

### I.N. Emergency Provision.

- I.N.1 An "emergency" is any situation arising from sudden and reasonably unforeseeable events beyond the control of the source, including acts of God, which situation requires immediate corrective action to restore normal operation, and that causes the source to exceed a technology-based emission limitation under this permit, due to unavoidable increases in emissions attributable to the emergency. An emergency shall not include noncompliance to the extent caused by improperly designed equipment, lack of preventive maintenance, careless or improper operation, or operator error. (R307-415-6g(1))
- I.N.2 An emergency constitutes an affirmative defense to an action brought for noncompliance with such technology-based emission limitations if the affirmative defense is demonstrated through properly signed, contemporaneous operating logs, or other relevant evidence that:
- I.N.2.a An emergency occurred and the permittee can identify the causes of the emergency. (R307-415-6g(3)(a))
- I.N.2.b The permitted facility was at the time being properly operated. (R307-415-6g(3)(b))
- I.N.2.c During the period of the emergency the permittee took all reasonable steps to minimize levels of emissions that exceeded the emission standards, or other requirements in this permit. (R307-415-6g(3)(c))
- I.N.2.d The permittee submitted notice of the emergency to the Executive Secretary within two working days of the time when emission limitations were exceeded due to the emergency. This notice must contain a description of the emergency, any steps taken to mitigate emissions, and corrective actions taken. This notice fulfills the requirement of Provision I.S.2.c below. (R307-415-6g(3)(d))
- I.N.3 In any enforcement proceeding, the permittee seeking to establish the occurrence of an emergency has the burden of proof. (R307-415-6g(4))
- I.N.4 This emergency provision is in addition to any emergency or upset provision contained in any other section of this permit. (R307-415-6g(5))

#### I.O. Operational Flexibility.

Operational flexibility is governed by R307-415-7d(1).

#### I.P. Off-permit Changes.

Off-permit changes are governed by R307-415-7d(2).

#### I.Q. Administrative Permit Amendments.

Administrative permit amendments are governed by R307-415-7e.

#### I.R. Permit Modifications.

Permit modifications are governed by R307-415-7f.

#### I.S. Records and Reporting.

I.S.1	Records.		
I.S.1.a	The records of all required monitoring data and support information shall be retained by the permittee for a period of at least five years from the date of the monitoring sample, measurement, report, or application. Support information includes all calibration and maintenance records, all original strip-charts or appropriate recordings for continuous monitoring instrumentation, and copies of all reports required by this permit. (R307-415-6a(3)(b)(ii)		
I.S.1.b	For all monitoring requirements described in Section II, Special Provisions, the source shall record the following information, where applicable: (R307-415-6a(3)(b)(i))		
I.S.1.b.1	The date, place as defined in this permit, and time of sampling or measurement.		
I.S.1.b.2	The date analyses were performed.		
I.S.1.b.3	The company or entity that performed the analyses.		
I.S.1.b.4	The analytical techniques or methods used.		
I.S.1.b.5	The results of such analyses.		
I.S.1.b.6	The operating conditions as existing at the time of sampling or measurement.		
I.S.1.c	Additional record keeping requirements, if any, are described in Section II, Special Provisions.		
I.S.2	Reports.		
I.S.2.a	Monitoring reports shall be submitted to the Executive Secretary every six months, or more frequently if specified in Section II. All instances of deviation from permit requirements shall be clearly identified in the reports. (R307-415-6a(3)(c)(i))		
I.S.2.b	All reports submitted pursuant to Provision I.S.2.a shall be certified by a responsible official in accordance with Provision I.K of this permit. (R307-415-6a(3)(c)(i)		
I.S.2.c	The Executive Secretary shall be notified promptly of any deviations from permit requirements including those attributable to upset conditions as defined in this permit, the probable cause of such deviations, and any corrective actions or preventative measures taken. <b>Prompt, as used in this condition, shall be defined as written notification within 14 days</b> . Deviations from permit requirements due to unavoidable breakdowns shall be reported in accordance with the provisions of R307-107. (R307-415-6a(3)(c)(ii))		
I.S.3	Notification Addresses.		
I.S.3.a	All reports, notifications, or other submissions required by this permit to be submitted to the Executive Secretary are to be sent to the following address or to such other address as may be required by the Executive Secretary:		

Utah Division of Air Quality P.O. Box 144820

Salt Lake City, UT 84114-4820

Phone: 801-536-4000

I.S.3.b All reports, notifications or other submissions required by this permit to be submitted to the EPA should be sent to one of the following addresses or to such other address as may be required by the Executive Secretary:

### For annual compliance certifications

Environmental Protection Agency, Region VIII Office of Enforcement, Compliance and Environmental Justice (mail code 8ENF) 999 18th Street, Suite 300 Denver, CO 80202-2466 For reports, notifications, or other correspondence related to permit modifications, applications, etc. Environmental Protection Agency, Region VIII Office of Partnerships & Regulatory Assistance Air & Radiation Program (mail code 8P-AR) 999 18th Street, Suite 300 Denver, CO 80202-2466

Phone: 303-312-6440

### I.T. Reopening for Cause.

- I.T.1 A permit shall be reopened and revised under any of the following circumstances:
- I.T.1.a New applicable requirements become applicable to the permittee and there is a remaining permit term of three or more years. No such reopening is required if the effective date of the requirement is later than the date on which this permit is due to expire, unless the terms and conditions of this permit have been extended pursuant to R307-415-7c(3), application shield. (R307-415-7g(1)(a))
- I.T.1.b The Executive Secretary or EPA determines that this permit contains a material mistake or that inaccurate statements were made in establishing the emissions standards or other terms or conditions of this permit. (R307-415-7g(1)(c))
- I.T.1.c EPA or the Executive Secretary determines that this permit must be revised or revoked to assure compliance with applicable requirements. (R307-415-7g(1)(d))
- I.T.1.d Additional applicable requirements are to become effective before the renewal date of this permit and are in conflict with existing permit conditions. (R307-415-7g(1)(e))
- I.T.2 Additional requirements, including excess emissions requirements, become applicable to a Title IV affected source under the Acid Rain Program. Upon approval by EPA, excess emissions offset plans shall be deemed to be incorporated into this permit. (R307-415-7g(1)(b)) To be deleted unless a Title IV source.
- I.T.3 Proceedings to reopen and issue a permit shall follow the same procedures as apply to initial permit issuance and shall affect only those parts of this permit for which cause to reopen exists. (R307-415-7g(2))

#### I.U. Inventory Requirements.

I.U.1 An emission inventory shall be submitted in accordance with the procedures of R307-150, Emission Inventories. (R307-150)

I.U.2 A Hazardous Air Pollutant Inventory shall be submitted in accordance with the procedures of R307-155, Hazardous Air Pollutant Inventory. (R307-155)

### I.V. Title IV and Other, More Stringent Requirements

Where an applicable requirement is more stringent than an applicable requirement of regulations promulgated under Title IV of the Act, Acid Deposition Control, both provisions shall be incorporated into this permit. (R307-415-6a(1)(b))

## **Section II: SPECIAL PROVISIONS**

II.A. Emission Unit(s) Permitted to Discharge Air Contaminants.

(R307-415-4(3)(a) and R307-415-4(4))

II.A.1 **Boiler Unit #1** (designated as Emission unit #01)

Unit Description: Nominal 480 MW gross capacity dry bottom, tangentially-fired utility boiler fired on subbituminous and bituminous coal using fuel oil during startup & flame stabilization. System is equipped with electrostatic precipitator and SO<sub>2</sub> FGD scrubber system

II.A.2 **Boiler Unit #2** (designated as Emission unit #02)

Unit Description: Nominal 480 MW gross capacity dry bottom tangentially-fired utility boiler fired on subbituminous and bituminous coal using fuel oil during startup & flame stabilization. System is equipped with an electrostatic precipitator.

II.A.3 **Coal Storage** (designated as Emission unit #4)

Unit Description: Existing covered coal storage facility and open coal pile. No unit-specific applicable requirements.

II.A.4 **Ash Landfill** (designated as Emission unit #3)

Unit Description: Ash and sludge disposal. No unit-specific applicable requirements.

II.A.5 **Unit #1 Cooling Towers** (designated as Emission unit #5)

Unit Description: Unit #1 cooling towers for the circulating water system. No unit-specific applicable requirements.

II.A.6 Unit #2 Cooling Towers (designated as Emission unit #6)

Unit Description: Unit #2 cooling towers for the circulating water system. No unit-specific applicable requirements.

II.A.7 **Coal Conveyors** (designated as Emission unit #8)

Unit Description: Coal transfer on plant site

II.A.8 **Ash Haul Road (dirt)** (designated as Emission unit #10a)

Unit Description: Unpaved ash haul road. No unit-specific applicable requirements.

II.A.9 **Ash Haul Road (paved)** (designated as Emission unit #10b)

Unit Description: Paved ash haul road. No unit-specific applicable requirements.

II.A.10 **Unit #1 Emergency Generator (diesel engine)** (designated as Emission unit #12)

Unit Description: Emergency generator (diesel engine) for Unit #1. No unitspecific applicable requirements.

II.A.11 **Unit #2 Emergency Generator (diesel engine)** (designated as Emission unit #13)

Unit Description: Emergency generator (diesel engine) for Unit #2. No unitspecific applicable requirements.

II.A.12 **Emergency Fire Pump (diesel engine)** (designated as Emission unit #14)

	Unit Description: Emergency fire pump (diesel engine). No unit-specific
	applicable requirements.
II.A.13	Auxiliary Steam Boiler for Unit #1 (designated as Emission unit #15)
	Unit Description: 120 MMBtu/hr auxiliary steam boiler fired on fuel oil and
TT A 1.4	constructed in 1975 for Unit #1. No unit-specific applicable requirements.
II.A.14	Auxiliary Steam Boiler for Unit #2 (designated as Emission unit #16)
	Unit Description: 93 MMBtu/hr auxiliary steam boiler fired on fuel oil and
II A 15	constructed in 1970 for Unit #2. No unit-specific applicable requirements.
II.A.15	<b>Coal Silo System Exhauster for Unit #1</b> (designated as Emission unit #17) Unit Description: Coal silos for Unit #1 equipped with exhausters and dust
	collectors. No unit-specific applicable requirements.
II.A.16	Coal Silo System Exhauster for Unit #2 (designated as Emission unit #18)
п.д.10	Unit Description: Coal silos for Unit #2 equipped with exhausters and dust
	collectors. No unit-specific applicable requirements.
II.A.17	Lime Silo Bin Vent (designated as Emission unit #19)
	Unit Description: Fabric filter baghouse on lime storage silo. No unit-specific
	applicable requirements.
II.A.18	<b>Distillate Fuel Oil Tanks</b> (designated as Emission unit #20)
	Unit Description: Three 70,000 gallon tanks (1973) and day tanks for the
	emergency diesel generators and fire pumps. No unit-specific applicable
	requirements.
II.A.19	Lube Oil Storage Tanks (designated as Emission unit #21)
	Unit Description: Four 10,000 gallon tanks that store lubricating oil including
	vents and associated equipment; two each constructed in 1973 and 1975. No
	unit-specific applicable requirements.
II.A.20	Oil Storage Area (designated as Emission unit #22)
	Unit Description: Storage area for oil contained in closed 55-gallon drums. No
П А 21	unit-specific applicable requirements.  Poved Aggreg Pond and Parking Area (designated as Emission unit #22)
II.A.21	Paved Access Road and Parking Area (designated as Emission unit #23) Unit Description: Paved access road from the plant entrance to the administration
	building and parking area. No unit-specific applicable requirements.
II.A.22	Cold Solvent Degreasing Operations (designated as Emission unit #24)
11.71.22	Unit Description: Bench-top cold degreasing units using Safety-Kleen, Simple
	Green, or other comparable degreasing agents. No unit-specific applicable
	requirements.
II.A.23	Miscellaneous Electrical Equipment (designated as Emission unit #25)
	Unit Description: Fugitive emission units including transformer insulating oil.
	No unit-specific applicable requirements.
II.A.24	Diesel Refueling Stations and Storage Tanks (designated as Emission unit #26)
	Unit Description: One 5,000 and one 1,500 gallon aboveground diesel fuel tank
	and dispensing pumps to refuel fleet vehicles and mobile equipment. No unit-
	specific applicable requirements.
II.A.25	Gasoline Vehicle Refueling Station and Tanks (designated as Emission unit #27)
	Unit Description: Gasoline refueling for fleet vehicles from two 1,500 gallon
	aboveground tanks constructed in December 1991. No unit-specific applicable
П 4 26	requirements.
II.A.26	Unit #1 Generator Seal Oil Air Detraining Tanks (designated as Emission unit #29-1)
	Unit Description: Atmospheric vents from the seal oil air detraining tanks for
II.A.27	Boiler Unit #1. No unit-specific applicable requirements.  Unit #2 Generator Seal Oil Air Detraining Tanks (designated as Emission unit #29-2)
11.1 1.4 /	care as deficition for the penalting runns (designated as Lineshon unit #25-2)

Unit Description: Atmospheric vents from the seal oil air detraining tanks for Boiler Unit #2. No unit-specific applicable requirements.

Unit #1 Lube Oil Reservoirs (designated as Emission unit #30-1)

Unit Description: Lube oil reservoirs with vapor extractors for Boiler Unit #1. No unit-specific applicable requirements.

II.A.29 Unit #2 Lube Oil Reservoirs (designated as Emission unit #30-2)

II.A.28

Unit Description: Lube oil reservoirs with vapor extractors for Boiler Unit #2. No unit-specific applicable requirements.

II.A.30 **Truck Mounted Vacuum System** (designated as Emission unit #31)

Unit Description: Mobile truck mounted vacuum to clean up spilled material such as ash. No unit-specific applicable requirements.

II.A.31 **Ash Unloader for Unit #1** (designated as Emission unit #32)

Unit Description: Equipment for unloading ash from silos and into trucks for transport to the ash landfill. No unit-specific applicable requirements.

II.A.32 **Ash Unloader for Unit #2** (designated as Emission unit #33)

Unit Description: Equipment for unloading ash from silos and into trucks for transport to the ash landfill. No unit-specific applicable requirements.

II.A.33 **Emission Units Subject to 40% Opacity Limit** (designated as Emission unit #34)
Unit Description: Units constructed prior to April 25, 1971 consisting of Boiler
Unit #2 coal silo system exhauster, Unit #2 ash unloader, Unit #2 Generator Seal
Oil Air Detraining Tanks, Unit #2 Lube Oil Resevoirs, and the auxiliary boiler
for Unit #2.

II.A.34 Coal Reject Handling System (designated as Emission unit #35)

Unit Description: Material handling system that separates reject materials from the coal prior to pulverizing. No unit-specific applicable requirements.

II.A.35 **Hazardous Waste Storage Area** (designated as Emission unit #36)

Unit Description: Area where hazardous waste is stored temporarily awaiting disposal. No unit-specific applicable requirements.

II.A.36 **Electro-hydraulic Control Reservoirs** (designated as Emission unit #37)

Unit Description: Three 400 gallon tanks that store lubricating oil. No unitspecific applicable requirements.

II.A.37 **Water Treatment Chemical Tanks** (designated as Emission unit #38)

Unit Description: Tank storage including chlorine, aluminum sulfate, lime, sodium sulfite, soda ash, calcium hypochlorite, sodium hydroxide, anti-scale, aqueous ammonia. No unit-specific applicable requirements.

II.A.38 **Anhydrous Sulfur Dioxide Tank** (designated as Emission unit #39)

Unit Description: 10,000 gallon anhydrous sulfur dioxide tank to generate SO3 for ESP flue gas conditioning. No unit-specific applicable requirements.

II.A.39 **Paint Storage Areas** (designated as Emission unit #40)

Unit Description: Various storage areas for sealed paint containers. No unitspecific applicable requirements.

II.A.40 **Coal handling and Blending Equipments** (designated as Emission unit #41)

Unit Description: Includes truck unloading hopper enclosed on the sides with water sprays, covered conveyor belts with enclosed transfer stations, radial stacker, Stamler feeder with water sprays, and screens.

#### II.B. Requirements and limitations.

The following emission limitations, standards, and operational limitations apply to the permitted facility as indicated: (R307-415-6a(1))

### II.B.1 Conditions on permitted source (Source-wide)

#### II.B.1.a **Condition:**

Emissions from sources of fugitive dust shall be minimized. The permittee shall develop and implement a fugitive dust control plan, approved by the Executive Secretary, that minimizes fugitive dust. Compliance shall be based on the permittee adhering to the approved fugitive dust control plan. Natural sources of dust and fugitive emissions are not fugitive dust within the meaning of this condition.

- 1. Contents of Fugitive Dust Control Plan. The fugitive dust control plan shall address fugitive dust sources including, but not limited to: material storage; material handling; material processing; roads, both paved and unpaved; loading; dumping; hauling; and operation areas. Control measures listed for all source categories in R307-12 shall be considered.
- 2. Use of Multiple Levels of Control. The plan shall describe multiple levels of fugitive dust control for each fugitive dust source or fugitive dust-generating activity. The first level describes the minimum level of fugitive dust control, while the next levels describe control methods that are progressively more stringent. If a fugitive dust observation is made that exceeds the monitoring indicator for the plan, the fugitive dust control level shall be increased to the next most stringent control level. If a fugitive dust observation meets the monitoring indicator for the plan, the fugitive dust control level may be maintained at its current level or may be relaxed to the next less stringent level if indicators are not likely to be exceeded.
- 3. Monitoring. The plan shall describe visual indicators that will be used to determine the appropriate level of control to minimize fugitive dust for each source of dust. Procedures on how observations are made and documented shall be addressed.
- 4. Revision of the Plan. The Executive Secretary may require revision of the fugitive dust control plan if it is determined that the plan is not effective from visual observations, citizen complaints, or other means. The permittee may also request revisions to the plan. Revisions to the plan do not require revision of this permit but must be submitted to, and approved by, the Executive Secretary. [Authority granted under R307-12-3 and R307-415-6c(1); condition originated in DAQE-119-02]

#### II.B.1.a.1

#### **Monitoring:**

- a. Records that document actions taken to implement the fugitive dust control plan shall also serve as monitoring.
- b. The permittee shall perform periodic visual observations of each source of fugitive dust as described in the fugitive dust control plan.

#### II.B.1.a.2 **Recordkeeping:**

- a. Records of all actions taken to implement the fugitive dust control plan shall be maintained and include the date and time the action was taken.
- b. Results of fugitive dust observations shall be maintained for five years and as described in the fugitive dust control plan.

## II.B.1.a.3 Reporting:

There are no reporting requirements for this provision except those specified in Section I of this permit.

#### II.B.1.b **Condition:**

A Risk Management Plan (RMP) developed in accordance with 40 CFR Part 68 shall be submitted to the United States Environmental Protection Agency not later than the applicable date in 40 CFR 68.10(a). [Authority granted under 40 CFR 68; condition originated in 40 CFR Part 68]

### II.B.1.b.1 **Monitoring:**

A copy of the Risk Management Plan shall be available upon request along with a copy of the transmittal letter to EPA.

#### II.B.1.b.2 **Recordkeeping:**

A copy of the Risk Management Plan shall be available to the Executive Secretary upon request along with a copy of the transmittal letter to EPA.

#### II.B.1.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

#### II.B.1.c Condition:

The permittee shall comply with the applicable requirements for recycling and emission reduction for class I and class II refrigerants pursuant to 40 CFR 82, Subpart F - Recycling and Emissions Reduction. [Authority granted under 40 CFR 82.150(b); condition originated in 40 CFR Part 82, Subpart F]

#### II.B.1.c.1 **Monitoring:**

The permittee shall certify, in the annual compliance statement required in Section I of this permit, its compliance status with the requirements of 40 CFR 82, Subpart F.

#### II.B.1.c.2 **Recordkeeping:**

All records required in 40 CFR 82, Subpart F shall be maintained consistent with the requirements of Provision S.1 in Section I of this permit.

#### II.B.1.c.3 Reporting:

All reports required in 40 CFR 82, Subpart F shall be submitted as required. There are no additional reporting requirements except as outlined in Section I of this permit.

#### II.B.1.d **Condition:**

Sulfur content of fuel oil shall be no greater than 0.85 lbs/MMBtu heat input. [Authority granted under R307-203-1(1); condition originated in R307-203-1(1)]

#### II.B.1.d.1 **Monitoring:**

The following specifications shall be recorded for each purchase of fuel: weight percent sulfur, gross heating value (Btu per unit volume), and density. All specifications shall be ascertained in accordance with methods of American Society for Testing and Materials.

Sulfur content in lbs/MMBtu shall be determined by the following equation:

S lbs/MMBtu = [(Weight percent sulfur/100) x Density (lb/gal)] / [(gross heating value (Btu/gal)) x (1 MMBtu/1,000,000 Btu)]

The permittee may obtain the above specifications by testing each purchase of fuel in accordance with the required methods; by inspection of the specifications provided by the vendor for each purchase of fuel; or by inspection of summary documentation of the fuel sulfur content from the vendor, provided that the above specifications are available from the vendor for each purchase if requested.

### II.B.1.d.2 **Recordkeeping:**

The records required for monitoring shall be maintained as described by Provision S.1 in Section I of this permit.

#### II.B.1.d.3 Reporting:

There are no reporting requirements for this provision except those specified in Section I of this permit.

#### II.B.1.e Condition:

The permittee shall not discharge into the atmosphere from any abrasive blasting any air contaminant for a period or periods aggregating more than three minutes in any one hour which is a shade or density darker than 40% opacity. [Authority granted under R307-206; condition originated in R307-206]

#### II.B.1.e.1 **Monitoring:**

Visible emission evaluation shall be conducted every six months if abrasive blasting operations are conducted. Visible emission evaluation of abrasive blasting operations shall be conducted in accordance with the following provisions:

- a. Emissions from unconfined blasting shall be read at the densest point of the emission after a major portion of the spent abrasive has fallen out, at a point not less than five feet nor more than twenty-five feet from the impact surface from any single abrasive blasting nozzle.
- b. Emissions from unconfined blasting employing multiple nozzles shall be judged as a single source unless it can be demonstrated by the owner

or operator that each nozzle, evaluated separately, meets the emission and performance standards provided for in R307-206.

c. Emissions from confined blasting shall be read at the densest point after the air contaminant leaves the enclosure.

#### II.B.1.e.2 **Recordkeeping:**

Results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

### II.B.1.e.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

#### II.B.1.f Condition:

Visible emissions shall be no greater than 20 percent opacity except Boilers #1 and #2 tall stacks, units included in Emission Unit #34 which are subject to a 40 percent opacity limit, diesel engines as described in R307-201-1, and Emission Unit #41. [Authority granted under R307-201-1(2); condition originated in DAQE-AN0238008A-03]

#### II.B.1.f.1 **Monitoring:**

A visual observation of the site shall be made at least once each month. If visible emissions are noted, a Method 9 observation shall be conducted to determine the percent opacity and, if opacity exceeds the limit, maintenance shall be performed on the affected unit to correct the problem.

### II.B.1.f.2 **Recordkeeping:**

A log of the visual inspections shall be maintained in accordance with Provision I.S.1 of this permit, including the date and time of each inspection and the name of the person making the inspection. If an excess visible emission is indicated, a notation of the resulting maintenance activity will also be made in the log, and shall include the date of the maintenance request, the date the maintenance was performed, the type of maintenance performed, and the name of the person responsible for the maintenance. The visual inspection log may reference a maintenance log if needed.

### II.B.1.f.3 **Reporting:**

- a. Opacity readings exceeding the limit shall be reported as a permit deviation.
- b. There are no additional reporting requirements for this provision except those specified in Section I of this permit.

#### II.B.2 Conditions on Boiler Unit #1 (Emission unit #01)

#### II.B.2.a **Condition:**

Emissions of SO<sub>2</sub> shall be no greater than 20 percent of the potential combustion concentration based on the average inlet and average outlet SO<sub>2</sub> emissions determined as the arithmetic average of all hourly emission rates for the 30 successive boiler operating days. [Authority granted under R307-401-6(1) [BACT]; condition originated in DAQE-AN0238008A-03]

#### II.B.2.a.1 **Monitoring:**

- The permittee shall install, calibrate, maintain, and operate a continuous monitoring system, and record the output of the system, for measuring sulfur dioxide emissions. The permittee shall determine compliance with the SO<sub>2</sub> reduction limit by periodic monitoring using procedures in 40 CFR Part 60.46a. Compliance provision (subparagraph (c), (d), (e), (g) and (h)), 60.47a, Emission monitoring (subparagraph (b), (d), (e), (f), (g), (h), (i) and (j)), and 60.48a, Compliance determination procedures and methods (subparagraph (c)).
- Each continuous emissions monitoring system shall meet the b. following requirements:
  - 40 CFR Part 75, Appendix A, Specification and Test Procedures
    - 1. Installation and Measurement Location
- 2. Equipment Specifications (except the requirement for a low range in 2.1.1.2)
  - 3. Performance Specifications
  - 4. Data Acquisition and Handling Systems
  - 5. Calibration Gas
- The quality assurance requirements of R307-170, Continuous Emission Monitoring Systems Program, may be used to fulfill the 40 CFR 60.13(d)(1) continuous emission monitor data quality assurance requirements.
- An "as-fired" fuel testing program (upstream of coal pulverizers) meeting the requirements of Method 19 (40 CFR Part 60 Appendix A) may be used as an alternative method to determine potential sulfur dioxide emissions in place of a continuous sulfur dioxide emission monitor at the inlet to the sulfur dioxide control device. The permittee shall prepare a quality assurance (QA) plan for the coal sampling equipment, coal custody procedures, and laboratory analysis. Method 19 and ASTM QA procedures may be used as part of the plan.

### **Recordkeeping:**

The permittee shall maintain a file of all measurements, including continuous monitoring system, monitoring device, and performance testing measurements; all continuous monitoring system performance evaluations; all continuous monitoring system or monitoring device calibration checks; adjustments and maintenance performed on these systems or devices; and all other information

required by applicable portions of 40 CFR Part 60, Subparts A and D recorded in a permanent form suitable for inspection.

- b. The permittee shall maintain records of the occurrence and duration of any startup, shutdown, or malfunction in the operation of the unit; any malfunction of the air pollution control equipment; or any periods during which a continuous monitoring system or monitoring device is inoperative.
- c. The permittee shall maintain records demonstrating adherence to the fuel testing program QA plan if fuel testing is performed.

#### II.B.2.a.3

#### **Reporting:**

- a. The permittee shall report 30-day periods during which the SO<sub>2</sub> reduction requirement was not met in the next NSPS excess emission report.
- b. The permittee shall submit notifications and reports to the Executive Secretary as required by R307-170, Continuous Emission Monitoring Systems Program.
- c. There are no additional reporting requirements for this provision except those specified in Section I of this permit.
- d. The reports required in paragraphs a and b above are considered prompt notification of permit deviations required in provision I.S.2.c of this permit if all information required by provision I.S.2.c is included in the report.
- e. Deviations from permit requirements due to unavoidable breakdowns shall be reported in accordance with the provisions of R307-107.

#### II.B.2.b Condition:

At all times, including periods of startup, shutdown, and malfunction, the permittee shall, to the extent practicable, maintain and operate any permitted plant equipment, including associated air pollution control equipment, in a manner consistent with good air pollution control practice for minimizing emissions. Determination of whether acceptable operating and maintenance procedures are being used will be based on information available to the Executive Secretary which may include, but is not limited to, monitoring results, opacity observations, review of operating and maintenance procedures, and inspection of the source. [Authority granted under R307-401-5 and 40 CFR 60.11(d); condition originated in DAQE-AN0238008A-03]

#### II.B.2.b.1

#### **Monitoring:**

Records required for this permit condition will serve as monitoring.

#### II.B.2.b.2 **Recordkeeping:**

Permittee shall document activities performed to assure proper operation and maintenance. Records shall be maintained in accordance with Provision I.S.1 of this permit.

#### II.B.2.b.3 **Reporting:**

In addition to the reports required in Section I of this permit, the following reports shall be submitted:

- a. An annual projection of planned outages for steam boilers and associated pollution control equipment shall be submitted to the Executive Secretary not later than January 30 for each calendar year.
- b. Changes to the schedule of planned outages shall be reported to the Executive Secretary within 96 hours after the start of the outage.
- c. Maintenance outages shall be reported promptly or according to other applicable reporting criteria in Provision I.S.

#### II.B.2.c Condition:

Emissions of  $SO_2$  shall be no greater than 1.2 lb/MMBtu heat input for any 3-hour period as determined by the arithmetic average of three contiguous one-hour periods except during periods of startup, shutdown, maintenance/planned outage, or malfunction. [Authority granted under 40 CFR 60.43(a), 60.45(g), 60.8(c); condition originated in DAQE-AN0238008A-03]

#### II.B.2.c.1 **Monitoring:**

- a. The permittee shall install, calibrate, maintain, and operate a continuous monitoring system for measuring sulfur dioxide emissions. The permittee shall determine compliance by periodic monitoring using procedures in 40 CFR Part 60.45, Emission and fuel monitoring (subparagraphs (a), (e), and (f)) and 60.13(e).
- b. Each continuous emission monitoring system shall meet the following requirements:
  - 40 CFR Part 75, Appendix A, Specification and Test Procedures
    - 1. Installation and Measurement Location
- 2. Equipment Specifications (except the requirement for a low range in 2.1.1.2)
  - 3. Performance Specifications
  - 4. Data Acquisition and Handling Systems
  - 5. Calibration Gas
- c. The quality assurance requirements of R307-170, Continuous Emission Monitoring Systems Program, may be used to fulfill the 40 CFR 60.13(d)(1) continuous emission monitor data quality assurance requirements.

#### II.B.2.c.2 **Recordkeeping:**

- The permittee shall maintain a file of all measurements, including continuous monitoring system, monitoring device, and performance testing measurements; all continuous monitoring system performance evaluations; all continuous monitoring system or monitoring device calibration checks; adjustments and maintenance performed on these systems or devices; and all other information required by applicable portions of 40 CFR Part 60, Subparts A and D recorded in a permanent form suitable for inspection. (40 CFR 60.7(f))
- b. The permittee shall maintain records of the occurrence and duration of any startup, shutdown, or malfunction in the operation of the unit; any malfunction of the air pollution control equipment; or any periods during which a continuous monitoring system or monitoring device is inoperative (40 CFR 60.7(b)). (origin: 40 CFR 60.7(b) & (f) and R307-415-6a(3)(B)(ii)))

#### II.B.2.c.3 **Reporting:**

- The permittee shall submit excess emission reports required by a. 40 CFR 60.7(c) and (d) and 40 CFR 60.49a, Reporting requirements. A data assessment report required by Appendix F, Procedure 1, Section 7 to 40 CFR Part 60 shall be submitted with the excess emission report.
- The permittee shall submit notifications and reports to the Executive Secretary as required by R307-170, Continuous Emission Monitoring Systems Program.
- A copy of all reports required by 40 CFR Part 60 to be submitted c. to the Executive Secretary (permitting authority) shall also be submitted to USEPA, Region VIII, if requested. (40 CFR 60.4 and 60.7(c))
- d. The reports required in paragraphs a, b, and c above are considered prompt notification of permit deviations required in provision I.S.2.c of this permit if all information required by provision I.S.2.c is included in the report.
- Deviations from permit requirements due to unavoidable breakdowns shall be reported in accordance with the provisions of R307-107. (origin: 40 CFR 60.4, 60.7(c), and 60.45(g))

#### II.B.2.d **Condition:**

Emissions of NOx shall be no greater than 0.70 lb/MMBtu heat input for any 3hour period as determined by the arithmetic average of three contiguous one-hour periods except during periods of startup, shutdown, maintenance/planned outage or malfunction. [Authority granted under 40 CFR 60.44(a)(3), 60.45(g)(3), and 60.8(c); condition originated in DAQE-AN0238008A-03]

#### II.B.2.d.1 **Monitoring:**

The permittee shall install, calibrate, maintain, and operate a continuous monitoring system for measuring nitrogen oxides emissions.

The permittee shall determine compliance by periodic monitoring using procedures in 40 CFR Part 60.45, Emission and fuel monitoring (subparagraphs (a), (e), and (f)) and 60.13(e).

- b. Each continuous emission monitoring system shall meet the following requirements:
  - 40 CFR Part 75, Appendix A, Specification and Test Procedures
    - 1. Installation and Measurement Location
- 2. Equipment Specifications (except the requirement for a low range in 2.1.1.2)
  - 3. Performance Specifications
  - 4. Data Acquisition and Handling Systems
  - 5. Calibration Gas
- The quality assurance requirements of R307-170, Continuous Emission Monitoring Systems Program, may be used to fulfill the 40 CFR 60.13(d)(1) continuous emission monitor data quality assurance requirements.

#### **Recordkeeping:**

- The permittee shall maintain a file of all measurements, a. including continuous monitoring system, monitoring device, and performance testing measurements; all continuous monitoring system performance evaluations; all continuous monitoring system or monitoring device calibration checks; adjustments and maintenance performed on these systems or devices; and all other information required by applicable portions of 40 CFR Part 60, Subparts A and D recorded in a permanent form suitable for inspection. (40 CFR 60.7(f))
- b. The permittee shall maintain records of the occurrence and duration of any startup, shutdown, or malfunction in the operation of the unit; any malfunction of the air pollution control equipment; or any periods during which a continuous monitoring system or monitoring device is inoperative (40 CFR 60.7(b)). (origin: 40 CFR 60.7(b) & (f) and R307-415-6a(3)(B)(ii)))

#### Reporting:

- The permittee shall submit excess emission reports required by 40 CFR 60.7(c) and (d) and 40 CFR 60.49a, Reporting requirements. A data assessment report required by Appendix F, Procedure 1, Section 7 to 40 CFR Part 60 shall be submitted with the excess emission report.
- The permittee shall submit notifications and reports to the b. Executive Secretary as required by R307-170, Continuous Emission Monitoring Systems Program.
- A copy of all reports required by 40 CFR Part 60 to be submitted to the Executive Secretary (permitting authority) shall also be submitted to USEPA, Region VIII, if requested. (40 CFR 60.4 and 60.7(c))

II.B.2.d.2

II.B.2.d.3

- d. The reports required in paragraphs a, b, and c above are considered prompt notification of permit deviations required in provision I.S.2.c of this permit if all information required by provision I.S.2.c is included in the report.
- e. Deviations from permit requirements due to unavoidable breakdowns shall be reported in accordance with the provisions of R307-107. (origin: 40 CFR 60.4, 60.7(c), and 60.45(g))

#### II.B.2.e Condition:

Emissions of particulate matter (PM) shall not be greater than 0.10 lb/MMBtu heat input except during periods of startup, shutdown, maintenance/planned outage or malfunction. [Authority granted under 40 CFR 60.42(a)(1) and 60.8(c); condition originated in DAQE-AN0238008A-03]

#### II.B.2.e.1 **Monitoring:**

- a. Stack testing to show compliance with the PM emission limitations shall be performed as specified below:
- 1. Testing and Frequency. Emissions shall be tested each year. The source may also be tested at any time if directed by the Executive Secretary.
- 2. Notification. The permittee shall provide a notification of the test date at least 30 days before the test. A pretest conference shall be held, if directed by the Executive Secretary, between the permittee, the tester, and the Executive Secretary.
- 3. Compliance determination procedures and stack test methods shall be performed according to 40 CFR 60 Subpart D, 60.46.
- b. The number of transformer-rectifier (T-R) sets in service shall be determined once every 24 hours that the unit is in operation. If the number of sets in service falls below 80 percent, corrective action shall be taken as soon as reasonably practicable to improve control equipment performance and to return the number of T-R sets in service to at least 90 percent of the total number.

#### II.B.2.e.2 **Recordkeeping:**

- a. The permittee shall maintain a file of all testing and all other information required by permit provision I.S.1 and applicable portions of 40 CFR Part 60, Subparts A and Da recorded in a permanent form suitable for inspection. (40 CFR 60.7(f))
- b. Documentation of the number of T-R sets in service shall be maintained in accordance with Provision I.S.1 of this permit, including the date and time of each determination and the name of the person making the determination. If the number of T-R sets in service is below

the required percentage, a record of the corrective action will also be maintained. This record shall include the date of the maintenance request, the date the maintenance was performed, the type of maintenance performed, and the name of the person responsible for the maintenance. The record may reference a maintenance log if needed.

c. The permittee shall maintain records of the occurrence and duration of any startup, shutdown, or malfunction in the operation of the unit; or any malfunction of the air pollution control equipment. (40 CFR 60.7(b)).

#### II.B.2.e.3

There are no reporting requirements for this provision except those specified in Section I of this permit.

#### II.B.2.f Condition:

Visible emissions shall be no greater than 20 percent opacity (six-minute average) except for one six-minute period per hour of not more than 27 percent opacity and except during periods of start-up, shutdown, maintenance/planned outage, or malfunction. [Authority granted under 40 CFR 60.42(a)(2), 60.45(g)(1), and 60.8(c); condition originated in DAQE-AN0238008A-03]

### II.B.2.f.1 **Monitoring:**

**Reporting:** 

- a. The permittee shall determine compliance with the visible emission limit by periodic monitoring using a continuous opacity monitoring (COM) system installed and operated in accordance with 40 CFR 60.45, Emission and fuel monitoring (subparagraphs (a) and (g)) and 60.13(e).
- b. Each continuous opacity monitoring system shall meet the following quality assurance requirements:

40 CFR 60.13, Monitoring requirements (subparagraphs (d) and (f))

40 CFR Part 60, Appendix B, Performance Specification 1, Specifications and Test Procedures for Opacity Continuous Emission Monitoring Systems in Stationary Sources

R307-170, Continuous Emission Monitoring System Program

c. If both Method 9 and COM data are available, the Method 9 data shall be used to determine compliance. Method 9 may also be used to determine compliance during periods when the COM is out of service.

#### Recordkeeping:

a. The permittee shall maintain a file of all measurements, including continuous monitoring system, monitoring device, and performance testing measurements; all continuous monitoring system performance evaluations; all continuous monitoring system or monitoring device calibration checks; adjustments and maintenance performed on these systems or devices; and all other information

required by applicable portions of 40 CFR Part 60, Subparts A and D recorded in a permanent form suitable for inspection. (40 CFR 60.7(f))

b. The permittee shall maintain records of the occurrence and duration of any startup, shutdown, or malfunction in the operation of the unit; any malfunction of the air pollution control equipment; or any periods during which a continuous monitoring system or monitoring device is inoperative (40 CFR 60.7(b)). (origin: 40 CFR 60.7(b) & (f) and R307-415-6a(3)(B)(ii)))

#### II.B.2.f.3

#### **Reporting:**

- a. The permittee shall submit excess emission reports required by 40 CFR 60.7(c) and (d) and 40 CFR 60.49a, Reporting requirements. A data assessment report required by Appendix F, Procedure 1, Section 7 to 40 CFR Part 60 shall be submitted with the excess emission report.
- b. The permittee shall submit notifications and reports to the Executive Secretary as required by R307-170, Continuous Emission Monitoring Systems Program.
- c. A copy of all reports required by 40 CFR Part 60 to be submitted to the Executive Secretary (permitting authority) shall also be submitted to USEPA, Region VIII, if requested. (40 CFR 60.4 and 60.7(c))
- d. The reports required in paragraphs a, b, and c above are considered prompt notification of permit deviations required in provision I.S.2.c of this permit if all information required by provision I.S.2.c is included in the report.
- e. Deviations from permit requirements due to unavoidable breakdowns shall be reported in accordance with the provisions of R307-107. (origin: 40 CFR 60.4, 60.7(c), and 60.45(g))

#### II.B.3 Conditions on Boiler Unit #2 (Emission unit #02)

#### II.B.3.a **Condition:**

Sulfur content of any mixture of coal shall be no greater than 1 lbs/MMBtu gross heat input. [Authority granted under R307-203-1(1); condition originated in R307-203-1(1)]

#### II.B.3.a.1 **Monitoring:**

The sulfur content shall be determined by ASTM Method D-3177, D-4239 or approved equivalent. A grab sample, from each day of coal burning and representative of the coal actually being fed to the boiler, shall be collected. The daily samples shall be consolidated at least monthly and submitted to a laboratory for analysis. The permittee shall prepare a quality assurance (QA) plan for the coal sampling procedures, coal custody procedures, and laboratory analysis. Method 19 and ASTM QA procedures may be used as part of the plan.

#### II.B.3.a.2 **Recordkeeping:**

The records required for monitoring shall be maintained as described by Provision S.1 in Section I of this permit.

### II.B.3.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

#### II.B.3.b Condition:

Visible emissions shall be no greater than 40 percent opacity (six-minute average) except for one three-minute period per hour as a result of unavoidable combustion irregularities and except during periods of start-up, shutdown, maintenance/planned outage, or malfunction. [Authority granted under R307-201-1; condition originated in R307-201-1]

### II.B.3.b.1 **Monitoring:**

- a. The permittee shall determine compliance with the visible emission limit by periodic monitoring using a continuous opacity monitoring (COM) system installed and operated in accordance with 40 CFR 60.45, Emission and fuel monitoring (subparagraphs (a) and (g)) and 60.13(e).
- b. Each continuous opacity monitoring system shall meet the following quality assurance requirements:

40 CFR 60.13, Monitoring requirements (subparagraphs (d) and (f))

40 CFR Part 60, Appendix B, Performance Specification 1, Specifications and Test Procedures for Opacity Continuous Emission Monitoring Systems in Stationary Sources

R307-170, Continuous Emission Monitoring System Program

c. If both Method 9 and COM data are available, the Method 9 data shall be used to determine compliance. Method 9 may also be used to determine compliance during periods when the COM is out of service.

#### II.B.3.b.2 **Recordkeeping:**

- a. The permittee shall maintain a file of all measurements, including continuous monitoring system, monitoring device, and performance testing measurements; all continuous monitoring system performance evaluations; all continuous monitoring system or monitoring device calibration checks; adjustments and maintenance performed on these systems or devices; and all other information required by 40 CFR Part 60, Subparts A and D recorded in a permanent form suitable for inspection.
- b. The permittee shall maintain records of the occurrence and duration of any startup, shutdown, or malfunction in the operation of the unit; any malfunction of the air pollution control equipment; or any

periods during which a continuous monitoring system or monitoring device is inoperative.

### II.B.3.b.3 **Reporting:**

In addition to the reports required in Section I of this permit, the following reports shall be submitted:

- a. The permittee shall submit quarterly reports described in 40 CFR 60.7(c) and (d) and 40 CFR 60.45(g) to the Executive Secretary.
- b. The permittee shall submit notifications and reports to the Executive Secretary as required by R307-170, Continuous Emission Monitoring Systems Program.
- c. The reports required in paragraphs a and b above are considered prompt notification of permit deviations required in provision I.S.2.c of this permit if all information required by provision I.S.2.c is included in the report.
- d. An annual projection of planned outages for steam boilers and associated pollution control equipment shall be submitted to the Executive Secretary not later than January 30 for each calendar year.
- e. Changes to the schedule of planned outages shall be reported to the Executive Secretary within 96 hours after the start of the outage.
- f. Maintenance outages shall be reported promptly or according to other applicable reporting criteria in Provision I.S.
- g. Deviations from permit requirements due to unavoidable breakdowns shall be reported in accordance with the provisions of R307-107.

#### II.B.4 Conditions on Coal Conveyors (Emission unit #8)

#### II.B.4.a **Condition:**

All coal conveyors and drop points shall be enclosed. [Authority granted under R307-12-2; condition originated in DAQE-AN0238008A-03]

#### II.B.4.a.1 **Monitoring:**

The permittee shall ensure the required covers are installed.

#### II.B.4.a.2 **Recordkeeping:**

A log shall be maintained for any periods of operation when the required covers are removed.

#### II.B.4.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

#### II.B.5 Conditions on Emission Units Subject to 40% Opacity Limit (Emission unit #34)

#### II.B.5.a **Condition:**

Visible emissions shall be no greater than 40 percent opacity. [Authority granted under R307-201-1; condition originated in R307-201-1]

#### II.B.5.a.1 **Monitoring:**

A visual observation of each limited point shall be made at least once each month. If visible emissions are noted, a Method 9 observation shall be conducted to determine the percent opacity.

### II.B.5.a.2 **Recordkeeping:**

A log of the visual inspections shall be maintained in accordance with Provision I.S.1 of this permit, including the date and time of each inspection and the name of the person making the inspection. If an excess visible emission is indicated, a notation of the resulting maintenance activity will also be made in the log, and shall include the date of the maintenance request, the date the maintenance was performed, the type of maintenance performed, and the name of the person responsible for the maintenance. The visual inspection log may reference a maintenance log if needed.

### II.B.5.a.3 **Reporting:**

- a. Opacity readings exceeding the limit shall be reported as a permit deviation.
- b. There are no additional reporting requirements for this provision except those specified in Section I of this permit.

### II.B.6 Conditions on Coal handling and Blending Equipments (Emission unit #41)

#### II.B.6.a **Condition:**

Visible emissions shall be no greater than 5 percent opacity for all conveyor transfer points and conveyor drop points. [Authority granted under R307- 401-6(1) [BACT) & 40 CFR 60.252 (c) [Subpart Y]; condition originated in DAQE-AN0238008A-03]

#### II.B.6.a.1 **Monitoring:**

An opacity determination shall be conducted once in each quarter that the affected emission unit is operated. The opacity determination shall be conducted in accordance with 40 CFR 60, Appendix A, Method 9.

#### II.B.6.a.2 **Recordkeeping:**

All data required by 40 CFR 60, Appendix A, Method 9 shall be maintained in accordance with Provision I.S.1 of this permit.

#### II.B.6.a.3 **Reporting:**

- a. Opacity readings exceeding the limit shall be reported as a permit deviation.
- b. There are no additional reporting requirements for this provision except those specified in Section I of this permit.

#### II.B.6.b **Condition:**

Visible emissions shall be no greater than 10 percent opacity for the truck unloading hopper, radial stacker and all screens. [Authority granted under R307-401-6(1) [BACT) & 40 CFR 60.252 (c) [Subpart Y]; condition originated in DAQE-AN0238008A-03]

#### II.B.6.b.1 **Monitoring:**

A visual observation of each affected emission unit shall be performed once each month that the unit operates, by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. The individual is not required to be a certified visible emissions observer (VEO). If any visible emissions are observed, an opacity determination of that emission unit shall be performed by a certified VEO in accordance with 40 CFR 60, Appendix A, Method 9 within 24 hours of the initial observation.

#### II.B.6.b.2 **Recordkeeping:**

A log of the visual opacity survey(s) shall be maintained in accordance with Provision I.S.1 of this permit. If an opacity determination is indicated, a notation of the determination will be made in the log. All data required by 40 CFR 60, Appendix A, Method 9 shall also be maintained in accordance with Provision I.S.1 of this permit.

#### II.B.6.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

### II.C. Emissions Trading.

(R307-415-6a(10))

Not applicable to this source.

#### **II.D.** Alternative Operating Scenarios.

(R307-415-6a(9))

Not applicable to this source.

#### **II.E.** Source-specific Definitions.

The following definitions apply to the permittee. They include terms not defined in state or federal rules or clarify or expand on existing definitions.

II.E.1 Startup. Start-up means the setting in operation of an affected facility for any purpose. For these units, startup begins when the ID and FD fans are started with the intent to fire the unit. Startup ends when the unit is in stable operation, and when the following operating parameters are met: (1) the temperature of both inlets to the electrostatic precipitator reach 220F, and (2) less than 20 percent of the boiler's heat input is being furnished by fuel oil.

- II.E.2 Shutdown. Shutdown means the cessation of operation of an affected facility for any purpose. For this permitted source, shutdown begins when the unit load or output is reduced with the intent of removing the unit from service, or when the unit trips as the result of a sudden and unforeseen failure or malfunction. Shutdown ends when the feeding of primary fuel to the boiler ceases and boiler conditions are such that maintenance could begin on the unit or startup begins, whichever comes first.
- II.E.3 *Down time*. Downtime is that time between the end of shutdown and the beginning of startup in which the affected source has temporarily ceased operation.
- II.E.4 *Maintenance Outage*. Removing the equipment from service availability for inspection and/or general overhaul of one or more major equipment groups. This outage usually is scheduled well in advance.
- II.E.5 Planned Outage. The removal of equipment from service availability to perform work on specific components that can be deferred beyond the end of the next weekend, but requires the equipment be removed from service before the next planed outage.

  Typically, a Maintenance Outage may occur anytime during the year, have a flexible start date, and may or may not have a predetermined duration.

### **Section III: PERMIT SHIELD**

The following requirements have been determined to be not applicable to this source in accordance with Provision I.M, Permit Shield:

III.A. 40 CFR, Part 60, Subpart Da (NSPS for Electric Utility Steam Generating Units for Which Construction is Commenced After September 18, 1978)

This regulation is not applicable to the Boiler Unit #1 (Emission unit #1) because this unit was constructed prior to September 18, 1978

III.B. 40 CFR, Part 60, Subpart D (NSPS for Fossil-Fuel-Fired Steam Generators for Which Construction is Commenced After August 17, 1971))

This regulation is not applicable to the Boiler Unit #2 (Emission unit #2) because this unit was constructed prior to August 17, 1971

III.C. 40 CFR, Part 60, Subpart Da (NSPS for Electric Utility Steam Generating Units for Which Construction is Commenced After September 18, 1978)

This regulation is not applicable to the Boiler Unit #2 (Emission unit #2) because this unit was constructed prior to September 18, 1978

III.D. 40 CFR Part 60, Subpart Db (NSPS for Industrial-Commercial-Institutional Steam Generating Units)

This regulation is not applicable to the Auxiliary Steam Boiler for Unit #1 (Emission unit #15) because 40 CFR 40b(a) excludes units constructed prior to June 9, 1989

# III.E. 40 CFR, Part 60, Subpart Dc (NSPS for Small Industrial-Commercial-Institutional Steam Generating Units)

This regulation is not applicable to the Auxiliary Steam Boiler for Unit #1 (Emission unit #15) because 40 CFR 40c(a) excludes units that have a maximum heat input greater than 100 mmBtu/hr and which were constructed prior to June 9, 1989

# III.F. 40 CFR Part 60, Subpart Db (NSPS for Industrial-Commercial-Institutional Steam Generating Units)

This regulation is not applicable to the Auxiliary Steam Boiler for Unit #2 (Emission unit #16) because 40 CFR 40b(a) excludes units constructed prior to June 9, 1989

# III.G. 40 CFR, Part 60, Subpart Dc (NSPS for Small Industrial-Commercial-Institutional Steam Generating Units)

This regulation is not applicable to the Auxiliary Steam Boiler for Unit #2 (Emission unit #16) because 40 CFR 40c(a) excludes units that have a maximum heat input greater than 100 mmBtu/hr and which were constructed prior to June 9, 1989

#### III.H. 40 CFR, Part 60, Subparts K, Ka, Kb (NSPS/ Volatile Organic Liquid Storage Vessels)

This regulation is not applicable to the Distillate Fuel Oil Tanks (Emission unit #20) because Subpart K, 60.111(b) and Ka, 60.111a(b) state that the standard does not apply to Nos. 2 through 6 fuel oils or diesel fuel oil. Subpart Kb is not applicable because the tanks were constructed prior to 1984.

#### III.I. 40 CFR, Part 60, Subparts K, Ka, Kb (NSPS/ Volatile Organic Liquid Storage Vessels)

This regulation is not applicable to the Gasoline Vehicle Refueling Station and Tanks (Emission unit # 27) because the two 1,500 gallon gasoline tanks have a capacity below the applicability criteria of any of the three standards

### III.J. 40 CFR, Part 60, Subpart O (NSPS for Sewage Treatment Plants)

This regulation is not applicable to the permitted source (Source-wide) because an affected facility as defined in these regulations (incinerator that combusts wastes > 10% of sewage sludge or > 2205 lb/day of sewage sludge) is not located at this source

#### III.K. 40 CFR, Part 60, Subpart OOO (Non-metallic mineral processing)

This regulation is not applicable to the permitted source (Source-wide) because the process of crushing and grinding nonmetallic minerals is not performed at this source

### III.L. 40 CFR, Part 63, Subpart Q (NESHAP for Industrial Process Cooling Towers)

This regulation is not applicable to the Unit #1 Cooling Towers (Emission unit # 5) because the cooling towers are not operated with chromium-based water treatment chemicals

#### III.M. 40 CFR, Part 63, Subpart Q (NESHAP for Industrial Process Cooling Towers)

This regulation is not applicable to the Unit #2 Cooling Towers (Emission unit # 6) because the cooling towers are not operated with chromium-based water treatment chemicals

## **Section IV: ACID RAIN PROVISIONS.**

### IV.A. Utah Acid Rain Program Authority.

Authority to implement the Acid Rain Program is contained in R307-417, *Permits: Acid Rain Sources*, and R307-415-6a(4), *Standard permit requirements* [for operating permits].

Sources, and R307-415-6a(4), Standard permit requirements [for operating permits].			
IV.B.	Permit Requirements.		
IV.B.1	The designated representative of the source and each affected unit at the source shall:		
IV.B.1.a	Submit a complete Acid Rain permit application (including a compliance plan) under R307-417 and 40 CFR Part 72 in accordance with the deadlines specified in 40 CFR 72.30; and		
IV.B.1.b	Submit in a timely manner any supplemental information that the Executive Secretary determines is necessary in order to review an Acid Rain permit application and issue or deny an Acid Rain permit;		
IV.B.2	The owners and operators shall:		
IV.B.2.a	Operate each affected unit at the source in compliance with a complete Acid Rain permit application or a superseding Acid Rain permit issued by the Executive Secretary; and		
IV.B.2.b	Have an Acid Rain Permit.		
IV.C.	Sulfur Dioxide Requirements.		
IV.C.1	The owners and operators of each affected unit at the source shall:		
IV.C.1.a	Hold allowances, as of the allowance transfer deadline, in the unit's compliance subaccount (after deductions under 40 CFR 73.34(c)) not less than the total annual emissions of sulfur dioxide for the previous calendar year from the unit; and		
IV.C.1.b	Comply with the applicable Acid Rain emissions limitations for sulfur dioxide.		

IV.C.3 An affected unit shall be subject to the requirements under Provision IV.C.1. of the sulfur dioxide requirements as follows:

Each ton of sulfur dioxide emitted in excess of the Acid Rain emissions limitations for

IV.C.3.a Starting January 1, 2000, an affected unit under 40 CFR 72.6(a)(2); or

sulfur dioxide shall constitute a separate violation of the Act.

IV.C.2

- IV.C.3.b Starting on the later of January 1, 2000 or the deadline for monitor certification under 40 CFR Part 75, an affected unit under 40 CFR 72.6(a)(3).
- IV.C.4 Allowances shall be held in, deducted from, or transferred among Allowance Tracking System accounts in accordance with the Acid Rain Program.
- IV.C.5 An allowance shall not be deducted in order to comply with the requirements under Provision IV.C.1.a. of the sulfur dioxide requirements prior to the calendar year for which the allowance was allocated.
- IV.C.6 An allowance allocated by the Administrator, USEPA, under the Acid Rain Program is a limited authorization to emit sulfur dioxide in accordance with the Acid Rain Program. No provision of the Acid Rain Program, the Acid Rain permit application, the Acid Rain permit, or the written exemption under 40 CFR 72.7 and 72.8 and no provision of law shall be construed to limit the authority of the United States to terminate or limit such authorization.
- IV.C.7 An allowance allocated by the Administrator, USEPA, under the Acid Rain Program does not constitute a property right.

#### IV.D. **Nitrogen Oxides Requirements.**

IV.D.1 Pursuant to 40 CFR 76.7, beginning January 1, 2000, the owner or operator shall not discharge, or allow to be discharged, emissions of NO<sub>x</sub> to the atmosphere in excess of the following limits, unless the affected units are complying with the provisions for early election for Group 1, Phase II boilers as set forth in 40 CFR 76.8 or are included in an approved averaging plan as set forth in 40 CFR 76.11:

IV.D.1.a 0.40 lb/MMBTU of heat input on an annual average basis for tangentially-fired boilers IV.D.1.b 0.46 lb/MMBtu of heat input on an annual average basis for dry-bottom wall-fired boilers (other than units applying cell burner technology). IV.D.2 Pursuant to 40 CFR 76.8(d)(2), beginning January 1, 2000, the Executive Secretary approves the early election plan for Boiler Unit #1 approved by the Administrator (USEPA) in a Phase I Acid Rain Permit for NO<sub>x</sub> Early Election issued by EPA on April 16, 1997. IV.D.3 Pursuant to 40 CFR 76.8(e)(3), the approved early election plan shall be in effect only until the earlier of January 1, 2008 or January 1 of the calendar year for which a termination of the plan takes effect. IV.D.3.a If the designated representative of the unit under an approved early election plan fails to demonstrate compliance with the applicable emissions limitation under 40 CFR 76.5 for any year during the period beginning January 1 of the first year the early election takes effect and ending December 31, 2007, the Executive Secretary shall terminate the plan. The termination shall take effect beginning January 1 of the year after the year for which there is a failure to demonstrate compliance, and the designated representative may not submit a new early election plan. IV.D.3.b The designated representative of the unit under an approved early election plan may terminate the plan any year prior to 2008 but may not submit a new early election plan. In order to terminate the plan, the designated representative shall submit a notice under 40 CFR 72.40(d) by January 1 of the year for which the termination is to take effect. IV.D.3.b.1 If an early election plan is terminated any year prior to 2000, the unit shall meet, beginning January 1, 2000, the applicable emissions limitation for NO<sub>x</sub> for Phase II units with Group 1 boilers under 40 CFR 76.7. IV.D.3.b.2 If an early election plan is terminated on or after 2000, the unit shall meet, beginning on the effective date of the termination, the applicable emissions limitation for NO<sub>x</sub> for Phase II units with Group 1 boilers under 40 CFR 76.7. IV.D.4 Pursuant to 40 CFR 76.8(a)(5), the owner or operator of a Phase II unit approved for early election may not incorporate the unit into an averaging plan prior to January 1, 2000. IV.D.5 Boiler Unit #1 is currently operating under the early election plan approved in Provision IV.D.2 of this permit. Boiler Unit #1 is subject to the following limitations: IV.D.5.a Effective January 1, 2000, emissions of NO<sub>x</sub> shall not exceed 0.45 lb/MMBtu heat input on an annual average basis except as provided in Provision IV.D.3 of this permit. IV.D.5.b If the owners and operators fail to comply with the early election plan approved in Provision IV.D.2, emissions of NO<sub>x</sub> shall not exceed 0.40 lb/MMBtu heat input on an annual average basis in accordance with Provision IV.D.3 of this permit. IV.D.5.c Effective January 1, 2008, emissions of NO<sub>x</sub> shall not exceed 0.40 lb/MMBtu heat input

on an annual average basis in accordance with Provision IV.D.1 of this permit.

IV.D.6 Pursuant to 40 CFR 76.11, the Executive Secretary approves a NO<sub>x</sub> emissions averaging plan submitted by the permittee on March 8, 1999.

IV.D.6.a The content of the averaging plan is as follows:

State	Plant Name	ID#	Emission Limitation, lb/MMBtu	ACEL, lb/MMBtu	Annual Heat Input Limit, MMBtu
WY	Dave Johnston	BW43	0.68	0.59	21,584,274
WY	Dave Johnston	BW44	0.40	0.53	41,160,518
UT	Hunter	3	0.46	0.43	28,610,089
UT	Huntington	2	0.40	0.42	34,307,019
WY	Jim Bridger	BW71	0.45	0.42	43,171,250
WY	Jim Bridger	BW72	0.45	0.40	44,337,267
WY	Jim Bridger	BW73	0.45	0.41	43,260,246
WY	Naughton	1	0.40	0.58	15,987,040
WY	Naughton	2	0.40	0.54	19,034,436
WY	Naughton	3	0.40	0.49	30,371,334
WY	Wyodak	BW91	0.50	0.33	36,439,773

IV.D.6.b This plan is effective from calendar year 2000 through calendar year 2002.

IV.D.6.c In accordance with 40 CFR 72.40(b)(2), approval of the averaging plan shall be final only when the Wyoming Department of Environmental Quality, Air Quality Division has also approved the averaging plan.

- IV.D.7 Pursuant to 40 CFR 76.11(d)(1), each affected unit in the approved averaging plan is in compliance with the Acid Rain emission limitation for NO<sub>x</sub> under the plan only if the following requirements are met:
- IV.D.7.a For each unit, the unit's actual annual average emission rate for the calendar year, in lb/MMBTU, is less than or equal to its alternative contemporaneous annual emission limitation (ACEL) in the averaging plan; and
- IV.D.7.a.1 For each unit with an alternative contemporaneous emission limitation less stringent than the applicable emission limitation in §§76.5, 76.6, or 76.7, the actual annual heat input for the calendar year does not exceed the annual heat input limit in the averaging plan;

IV.D.7.a.2

For each unit with an alternative contemporaneous annual emission limitation more stringent than the applicable emission limitation in §§76.5, 76.6, or 76.7, the actual annual heat input for the calendar year is not less than the annual heat input limit in the averaging plan; or

IV.D.7.b

If one or more of the units does not meet the requirements under Provision IV.D.8.A, the designated representative shall demonstrate, in accordance with 40 CFR 76.11(d)(1)(ii)(A) that the actual Btu-weighted annual average emission rate for the units in the plan is less than or equal to the Btu-weighted annual average rate for the same units had they each been operated, during the same period of time, in compliance with the applicable emission limitations in §§76.5, 76.6, or 76.7.

IV.D.7.b.1

If there is a successful group showing of compliance under 40 CFR 76.11(d)(1)(ii)(A) for a calendar year, then all units in the averaging plan shall be deemed to be in compliance for that year with their alternative contemporaneous annual emission limitations and annual heat input limits under Provision IV.D.8.A.

- IV.D.8 Pursuant to 40 CFR 76.11(d)(3), the designated representative may submit a notification to terminate an approved averaging plan in accordance with 40 CFR 72.40(d) no later than October 1 of the calendar year for which the plan is to be withdrawn or terminated.
- IV.D.9 Effective January 1, 2000, Boiler Unit #2 is included in and subject to the averaging plan approved in Provision IV.D.6 of this permit under unit designation Huntington 2..

### IV.E. Monitoring Requirements.

- IV.E.1 The owners and operators and, to the extent applicable, designated representative of each affected unit at the source shall comply with the monitoring requirements as provided in 40 CFR Parts 74, 75, and 76.
- IV.E.2 The emissions measurements recorded and reported in accordance with 40 CFR Part 75 shall be used to determine compliance by the unit with the Acid Rain emissions limitations and emissions reduction requirements for sulfur dioxide and nitrogen oxides under the Acid Rain Program.
- IV.E.3 The requirements of 40 CFR Parts 74 and 75 shall not affect the responsibility of the owners and operators to monitor emissions of other pollutants or other emissions characteristics at the unit under other applicable requirements of the Act and other provisions of the operating permit for the source.

#### IV.F. Recordkeeping and Reporting Requirements.

- IV.F.1 Unless otherwise provided, the owners and operators for each affected unit at the source shall keep on site at the source each of the following documents for a period of 5 years from the date the document is created. This period may be extended for cause, at any time prior to the end of 5 years, in writing by the Administrator, USEPA, or Executive Secretary:
- IV.F.1.a The certificate of representation for the designated representative for the source and each affected unit at the source and all documents that demonstrate the truth of the statements in the certificate of representation, in accordance with 40 CFR 72.24; provided that the certificate and documents shall be retained on site at the source beyond such 5-year

period until such documents are superseded because of the submission of a new certificate of representation changing the designated representative;

- IV.F.1.b All emissions monitoring information, in accordance with 40 CFR Part 75;
- IV.F.1.c Copies of all reports, compliance certifications, and other submissions and all records made or required under the Acid Rain Program; and,
- IV.F.1.d Copies of all documents used to complete an Acid Rain permit application and any other submission under the Acid Rain Program or to demonstrate compliance with the requirements of the Acid Rain Program.
- IV.F.2 The designated representative of each affected unit at the source shall submit the reports and compliance certifications required under the Acid Rain Program, including those under 40 CFR Part 72 Subpart I and 40 CFR Part 75.

### **IV.G.** Excess Emissions Requirements.

- IV.G.1 The designated representative of an affected unit that has excess emissions in any calendar year shall submit a proposed offset plan to the Administrator, USEPA, as required under 40 CFR Part 77.
- IV.G.2 The owners and operators of an affected unit that has excess emissions in any calendar year shall:
- IV.G.2.a Pay without demand the penalty required, and pay upon demand the interest on that penalty, to the Administrator, USEPA, as required by 40 CFR Part 77; and
- IV.G.2.b Comply with the terms of an approved offset plan, as required by 40 CFR Part 77.

#### IV.H. Liability.

- IV.H.1 Any person who knowingly violates any requirement or prohibition of the Acid Rain Program, a complete Acid Rain permit application, an Acid Rain permit, or a written exemption under R307-417, 40 CFR 72.7 or 40 CFR 72.8, including any requirement for the payment of any penalty owed to the United States, shall be subject to enforcement pursuant to section 113(c) of the Act.
- IV.H.2 Any person who knowingly makes a false, material statement in any record, submission, or report under the Acid Rain Program shall be subject to criminal enforcement pursuant to section 113(c) of the Act and 18 U.S.C. 1001.
- IV.H.3 No permit revision shall excuse any violation of the requirements of the Acid Rain Program that occurs prior to the date that the revision takes effect.
- IV.H.4 Each affected source and each affected unit shall meet the requirements of the Acid Rain Program.
- IV.H.5 Any provision of the Acid Rain Program that applies to an affected source (including a provision applicable to the designated representative of an affected source) shall also apply to the owners and operators of such source and of the affected units at the source.
- IV.H.6 Any provision of the Acid Rain Program that applies to an affected unit (including a provision applicable to the designated representative of an affected unit) shall also apply to the owners and

operators of such unit. Except as provided under 40 CFR 72.44 (Phase II repowering extension plans) and 40 CFR 76.11 (NO<sub>x</sub> averaging plans), and except with regard to the requirements applicable to units with a common stack under 40 CFR part 75 (including 40 CFR 75.16, 75.17, and 75.18), the owners and operators and the designated representative of one affected unit shall not be liable for any violation by any other affected unit of which they are not owners or operators or the designated representative and that is located at a source of which they are not the owners and operators, owners or operators, or the designated representative.

- IV.H.7 Each violation of a provision of 40 CFR Parts 72, 73, 74, 75, 76, 77, and 78 by an affected source or affected unit, or by an owner or operator or designated representative of such source or unit, shall be a separate violation of the Act.
- IV.H.8 The owners and operators of a unit governed by an approved early election plan shall be liable for any violation of the plan or 40 CFR 76.8 at that unit. The owners and operators shall be liable, beginning January 1, 2000, for fulfilling the obligations specified in 40 CFR Part 77.

#### IV.I. Effect on Other Authorities.

No provision of the Acid Rain Program, an Acid Rain permit application, an Acid Rain permit, or a written exemption under 40 CFR 72.7 or 72.8 shall be construed as:

- IV.I.1 Except as expressly provided in Title IV of the Act, exempting or excluding the owners and operators and, to the extent applicable, the designated representative from compliance with any other provision of the Act, including the provisions of Title I of the Act relating to applicable National Ambient Air Quality Standards or the Utah State Implementation Plan;
- IV.I.2 Limiting the number of allowances a unit can hold; *provided*, that the number of allowances held by the unit shall not affect the source's obligation to comply with any other provisions of the Act;
- IV.I.3 Requiring a change of any kind in any State law regulating electric utility rates and charges, affecting any State law regarding such State regulation, or limiting such State regulation, including any prudence review requirements under such State law;
- IV.I.4 Modifying the Federal Power Act or affecting the authority of the Federal Energy Regulatory Commission under the Federal Power Act; or.
- IV.I.5 Interfering with or impairing any program for competitive bidding for power supply in a State in which such program is established.

### REVIEWER COMMENTS

This operating permit incorporates all applicable requirements contained in the following documents:

DAQE-AN0238008A-03

dated October 02, 2003

# 1. Comment on an item originating in DAQE-AN0238008A-03 regarding permitted source (Source-wide)

Use of source definitions to improve enforceability: Several definitions are required for this source to more precisely define specific circumstances described in 40 CFR Part 60 during which excess emissions may be generated but may not constitute a violation.

These definitions include and expand upon the 40 CFR 60.2 definitions of startup and shutdown and are tailored to the equipment used at the permitted source. The definitions have been determined to be more stringent than the Part 60 definitions.

Part 60 also requires sources to operate and maintain equipment in a manner consistent with good pollution control practice for minimizing emissions (40 CFR 60.11(d)). In order to meet this requirement, sources must perform both scheduled and unscheduled maintenance. These maintenance periods are called planned outages and maintenance outages within the industry. These outages are defined by the North American Electric Reliability Council in its August 1996 Glossary of Terms. The Division of Air Quality and Utah Air Quality Board have required the electric utility plants to submit reports on these maintenance activities to better ensure compliance with Part 60 requirements.

The term downtime is also defined as the period between startup and shutdown during which the maintenance is performed and during which excess emissions may be generated. These emissions may not be a violation provided the source adheres to good pollution control practices as required by 40 CFR 60.11(d). [Comment last updated on 10/08/2003]

# 2. Comment on an item originating in DAQE-AN0238008A-03 regarding Boiler Unit #1 (Unit 01)

Part 60, Subpart D Opacity Limits: The NSPS sets opacity limits of 20 percent except for one six-minute period per hour during which opacity shall not exceed 27 percent. The Approval Order requires the source to meet an opacity limit of 20 percent at all times as set forth in R307-201-1(b). The AO does not address R307-201-1(g) which allows visible emissions to exceed the limit for three minute periods during unavoidable combustion irregularities. Since the rule does not limit the number of three minute periods per hour or the maximum opacity during these exceedances, the NSPS criteria of one six-minute period per hour at 27 percent opacity is more stringent and shall be used to determine compliance with R307-201-1(g). [Comment last updated on 10/08/2003]

#### 3. Comment on an item originating in R307-206-2 regarding permitted source (Source-wide)

Abrasive Blasting: Current maintenance practices for the electrostatic precipitators include periodic abrasive blasting to clean components. During these periods, the fans are operated at slow speed to allow the blasting operator to see inside the enclosure. This may result in opacity in excess of 40 percent from a tall boiler stack which would also exceed the 40% limit in R307-206-2. The visible emission limits for the boilers provide that exceedances may not be violations during system maintenance if the permittee complies with the 40 CFR 60.11(d) requirement to meet "good pollution control practices for minimizing emissions." The permittee must be able to demonstrate to the Executive Secretary that any excess emissions are being minimized if the 40 percent limit is exceeded. [Comment last updated on 12/07/1998]

# 4. Comment on an item originating in 40 CFR Part 60 Subpart D regarding Boiler Unit #1 (Unit 01)

Periodic monitoring for Particulate Matter (PM): 40 CFR 60.46 only requires initial compliance testing for PM, and no frequency for the PM mass limit testing is specified.

Originally, proposed periodic monitoring consisted of a five-year stack test coupled with general opacity monitoring and control equipment maintenance. EPA was asked for an informal evaluation of the acceptability of this approach as periodic monitoring. A survey of all EPA regions and several HQ officials strongly suggested that more frequent parametric monitoring would be required to meet Part 70 (and R307-415) criteria. Details of the survey and a memo are attached. Based on EPA's feedback, DAQ worked with the source to develop new periodic monitoring that combines annual stack tests with frequent parametric monitoring of the pollution control equipment.

The previous stack test results are as follows:

Unit 1:	Year of Test	Meth. 5 Test Results (lb/MMBtu)
	1993	0.015
	1988	0.021
	1983	0.02 (Modified Met. 8)
	1983	0.05
	1978	0.048
	1977	0.073

The test results were all below the Subpart D NSPS limit (0.10 lb/MMBtu) and the new permit limit of 0.05 lb/MMBtu.

This permit requires a stack test every year plus periodic monitoring of transformer-rectifier (T-R) sets in service. The annual stack tests by themselves do not provide data at a frequency that would be required to demonstrate continuous compliance for this source. Compliance may be inferred, however, on a more frequent basis if the source demonstrates that it operates and maintains the pollution control equipment in a manner consistent with good air pollution control. Although PacifiCorp monitors T-R sets, ESP voltages and current, spark rate, opacity, etc. periodically, direct and quantitative correlations of these parameters with the PM limit are not available. PacifiCorp proposed to use the number of T-R sets in service each day as an indicator for the performance of the ESP. By evaluating the number of T-R sets in service, potential ESP operation problems can be identified. For example, PacifiCorp has indicated that a decrease in T-R sets in service appears to have a greater impact on PM emissions than any other ESP parameter. The permit set 80% in service as a threshold to initiate corrective action to restore the number in service to 90%. These percentages are considered conservative given the wide margin of compliance in recent stack tests.

The annual stack test in conjunction with monitoring T-R sets in service meets all periodic monitoring criteria of R307-415-6a(3)(a)(ii). [Comment last updated on 12/07/1998]

# 5. Comment on an item originating in DAQE-AN0238008A-03 regarding Boiler Unit #1 (Unit 01)

Part 60 Monitoring for Non-Part 60 Emission Limits: The SO<sub>2</sub> reduction of 80 percent for Unit #1 is not a Part 60 emission limit, but Part 75/Part 60 CEMs and monitoring procedures are used as periodic monitoring for this limit. Therefore, failure to adhere to the specified monitoring would be a deviation from the permit condition but would not be a violation of Part 60 requirements. [Comment last updated on 10/08/2003]

# 6. Comment on an item originating in DAQE-AN0238008A-03 regarding Boiler Unit #1 (Unit 01)

Periodic Monitoring for Part 60, Subpart D SO<sub>2</sub> and NOx Limits: The Stationary Source Compliance Division (SSCD) of the U.S. Environmental Protection Agency issued a Memorandum, Use of Acid Rain CEMS as NSPS CEMS, on September 22, 1993. SSCD determined that since the CEMS requirements of 40 CFR Part 75 are equivalent to or more stringent than the requirements of 40 CFR Part 60, EPA can accept Acid Rain CEMs as NSPS CEMs provided that the utility demonstrates compliance with all applicable NSPS requirements. This policy was used to develop monitoring for this permit condition, however Part 60 and Part 75 requirements were compared in detail to ensure the most stringent criteria was incorporated into the permit condition. The following describes the rationale for the monitoring in this permit condition:

Subparagraph a in the monitoring provision for these emission limits identifies the applicable procedures for demonstrating compliance according to 40 CFR Part 60D.

Subparagraph b requires the use of a Part 75 compliant monitoring system to measure 40 CFR Part 60D regulated emissions. The Part 75 system hardware requirements are clearly more stringent and comprehensive than Part 60 CEM requirements and do not warrant detailed analysis here.

Subparagraph c sets forth the CEM quality assurance program. The quality assurance programs did require detailed analysis to compare rule stringency. Utility industry representatives and the Division of Air Quality researched the quality assurance and quality control requirements for the CEMS by 40 CFR Part 75, Part 60 Subpart Da and D, and Part 51 Appendix P. The results are contained in the attached table and include brief justification notes on the most demanding requirement. In addition, there are some QA/QC criteria required only by Part 75. Therefore, quality assured data as required by Part 75 can fulfill the requirements by Part 60. However, since the monitors are being used to fulfill Part 60 requirements, the monitor out-of-control criteria for Part 60 is applicable. The Part 60 requirements in 40 CFR 60.13 for Subpart D units are quite superfical so the procedures in R307-170 will be used. (See Review Comment #6)

Part 60 and Part 75 have different recordkeeping requirements, but the Part 75 data system is capable of providing the necessary emissions data. All additional recordkeeping is drawn from the other applicable rules.

Part 60 Subpart Da, D and Part 75 have different reports due to different emission standards and limitations. The emission reports for Part 60 and Part 75 will not be combined, and the permittee shall prepare separate reports. [Comment last updated on 10/08/2003]

# 7. Comment on an item originating in DAQE-AN0238008A-03 regarding Boiler Unit #1 (Unit 01)

Requirement for Low Range on Part 75 CEM Used for Part 60 Monitoring: Acid Rain monitors are being used to monitor compliance with Part 60 Subpart D emission limits. The equipment specification in Part 75, Appendix A, Section 2.1.1.2 requires that the monitor have a low range that is not necessary to determine compliance with the Part 60 limits. Therefore, this requirement has been exempted for the purposes of Part 60 monitoring only. The monitors must still have a low range capability for Section IV, Acid Rain compliance. [Comment last updated on 10/08/2003]

# 8. Comment on an item originating in DAQE-AN0238008A-03 regarding Boiler Unit #1 (Unit 01)

Part 60, Subpart D CEM QA Procedures: CEM quality assurance procedures for Subpart D units are set forth in 40 CFR 60.13(d)(1) and are very superficial. R307-170, Continuous Emission Monitor System Program, includes QA measures that include the Part 60.13 procedures as well as several more stringent requirements. Therefore, the Part 60 Subpart D CEM QA requirements are considered subsumed by R307-170. [Comment last updated on 10/08/2003]

# 9. Comment on an item originating in DAQE-AN0238008A-03 regarding Boiler Unit #1 (Unit 01)

Excess Emission Reports Used for Prompt Permit Deviation Reporting: Provision I.S.2.c. requires prompt reporting of all permit deviations and prompt is defined as 14 days. The boiler stacks have been equipped with highly reliable Acid Rain CEM systems required by Part 75. These systems include data handling systems that record and store data for very frequent intervals than can be used for determining excess emissions as defined in Part 60. Because of the reliability and frequency that data is collected, deviation reports at 14 day intervals would be burdensome to analyze. Utah DAQ currently employs electronic reporting for CEM sources and automated analysis software to determine periods of noncompliance. These reports are received quarterly. More frequent deviation reporting for emissions addressed by excess emission reports would not enhance environmental protection. Therefore, prompt is considered to be the date when Part 60 excess emission reports (EER) are required for units and pollutants included in the EERs. As noted in the condition, reporting of "unavoidable breakdowns" shall be as described in R307-107 and not delayed until the quarterly reports. [Comment last updated on 10/08/2003]

# 10. Comment on an item originating in 40 CFR Part 72, 73, 75, 76, 77 and 78 regarding Boiler Unit #1 (Unit 01)

Acid Rain Program Affected Units: Steam Generating Units #1 and #2 are affected units under the Acid Rain Program as set forth in 40 CFR Parts 72, 73, 75, 76, 77, and 78. The Acid Rain Boiler ID #'s are Boiler 1 and Boiler 2, respectively. Acid Rain requirements are contained in Section IV of the permit. All requirements of Section IV are enforceable upon the issue date of the permit unless otherwise specified in the condition (e.g. some SO<sub>2</sub> and NOx requirements). [Comment last updated on 11/13/1997]

# 11. Comment on an item originating in DAQE-AN0238008A-03 regarding Boiler Unit #1 (Unit 01)

Proper Operation and Maintenance of Equipment: This condition is based on both federal and state requirements. 40 CFR 60.11(d) requires that all NSPS regulated

facilities be properly maintained and operated. A similar requirement exists in R307-401-5 for all equipment permited by Approval Orders "be adequately and properly maintained." In previous versions of this permit, the requirement was applied to all equipment on the site, however, state and federal rules do not appear to include pre-1969 equipment at this time. Therefore, the condition was changed to apply only to Boiler #1 and associated equipment since Boiler #2 was constructed prior to 1969. [Comment last updated on 2/28/2002]

# 12. Comment on an item originating in 40 CFR Part 72, 73, 75, 76, 77 and 78 regarding Boiler Unit #2 (Unit 02)

Acid Rain Program Affected Units: Steam Generating Units #1 and #2 are affected units under the Acid Rain Program as set forth in 40 CFR Parts 72, 73, 75, 76, 77, and 78. The Acid Rain Boiler ID #'s are Boiler 1 and Boiler 2, respectively. Acid Rain requirements are contained in Section IV of the permit. All requirements of Section IV are enforceable upon the issue date of the permit unless otherwise specified in the condition (e.g. some  $SO_2$  and NOx requirements). [Comment last updated on 12/09/1997]

- 13. Comment on an item originating in 40 CFR Part 76 regarding Boiler Unit #1 (Unit 01)
  Acid Rain Program, Early Election of NOx Reduction: Acid Rain Boiler #1 is
  currently operating under a Phase I Acid Rain permit issued by EPA for the NOX Early
  Election Program according to 40 CFR 76.8. The EPA permit will remain in force
  through December 31, 1999 at which time the NOX reduction provisions in Section IV
  of this Phase II permit will become effective (January 1, 2000). [Comment last updated
  on 12/09/1997]
- 14. Comment on an item originating in R307-206 regarding permitted source (Source-wide)

  Abrasive blasting language correction: The original permit language for this requirement referred to portions of the rule that apply only to sources in non-attainment areas. The condition was changed to match the attainment-area condition used for the Hunter plant. [Comment last updated on 3/12/1999]

# 15. Comment on an item originating in PacifiCorp request regarding permitted source (Sourcewide)

Emission unit descriptions: The original permit language for this requirement (II.A.26) mistakenly described an emission unit as "Lube Oil Conditioners". The source has now corrected the unit to "Generator Seal Oil Air Detraining Tanks". The emission unit still has no applicable requirements, and no substantive change was made to the permit. [Comment last updated on 3/12/1999]

# 16. Comment on an item originating in PacifiCorp request regarding permitted source (Sourcewide)

Change of annual certification due date: PacifiCorp requested that the annual certification due dates for all of its sources be changed to April 1 for administrative reasons. PacifiCorp will be certifying compliance status for each calendar year, with 90 days to prepare the certifications. The certifications are based in part on information that is not available until 60 days after the end of the calendar year. The request to change the compliance certification due date was granted in the revised permit. [Comment last updated on 3/12/1999]

# 17. Comment on an item originating in This permit, previous version regarding permitted source (Source-wide)

Description of changes in the revision dated on February 14, 2000: Language from 40 CFR 76.11 was added to section IV of the permit to fully approve and incorporate the  $NO_x$  averaging plan originally approved in the June 29, 1999 reopening. Remaining language in section IV was reordered and/or clarified to match part 72 and 76 more closely.

Emission units #29 and #30 at II.A.26 and II.A.27 respectively were duplicated and modified to show that there are separate generator seal oil air detraining tanks and lube oil reservoirs at each main boiler. The Boiler Unit #2 equipment was added to Emission unit #34, Emission Units Subject to 40% Opacity Limit, since all of that equipment was pre-1971.

One phrase was added to condition II.B.3.b.3 to clarify that the reports in section I are still required.

The original reporting language in condition II.B.2.b.3 was inadvertently replaced in the June 29,1999 reopening. This error was corrected in this revision with the same modification as above.

Additionally, Pacificorp submitted notice on June 18, 1999 that the anhydrous sulfur dioxide tanks were out of service due to a change in the FGC (flue gas conditioning) system. This change and the concurrent elimination of chlorine from the cooling water treatment system remove the applicability of condition II.B.1.b, RMP. However, Pacificorp has asked that the condition remain in the permit in case a future modification once again triggers RMP requirements. [Comment last updated on 3/04/2002]

# 18. Comment on an item originating in C regarding Coal handling and Blending Equipments (Unit 41)

Part 60, Subpart Y Opacity Limits: The NSPS sets opacity limits of 20 percent. The Approval Order requires the source to meet an opacity limit of 5 percent for conveyor transfer and drop points; and 10 percent for screens, truck unloading hopper, and radial stacker. The AO limits are more stringent than NSPS limit. Therefore, the AO limits will supersede the NSPS limit. [Comment last updated on 10/08/2003]